

DETAILED ACTION

Applicant's response on March 23, 2009 to the Office Action dated August 29, 2008 is acknowledged. Claims 38, 39, 42 and 131-133 have been amended. Claims 38-42, 47, 50-57, 131-133, 144-147 and 149-151 are pending and present for examination.

Oath/Declaration

The oath or declaration submitted on March 23, 2009 has been reviewed and is in compliance with 37 CFR 1.56.

Information Disclosure Statement

The information disclosure statement filed on January 12, 2009 and March 23, 2009 for which a copy of the patent publication has been submitted in this application has been considered as shown by the Examiners signature.

Withdrawn - Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 38, 39, 41, 42, 47, 50-57, 131-133, 144-147 and 149-151 were rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 39, 41, 42, 47, 50-57, 131-133 and 149-151 were rejected for the recitation "analogue thereof". Applicants have cancelled this recitation. This rejection is withdrawn.

Art Unit: 1656

Furthermore claims 38, 144-147 were rejected because of the recitation "at least 90% identical to a Gal4 from *Saccharomyces cerevisiae*". This rejection is withdrawn following amendment to the claims.

Withdrawn -Claim Rejections - 35 USC § 112

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 39, 41, 42, 47, 50-57, 131-133 and 149-151 were rejected under 35 U.S.C. 112, first paragraph. This rejection has been withdrawn following applicants claim amendment and argument.

Withdrawn - Claim Rejections - 35 USC § 103

Claims 39, 41-42, 47, 50-57, 131-133 were rejected under 35 U.S.C. 103(a) as being unpatentable over Schultz et al (US 20050186657 A1 now US 7,129,333 B2).

Applicants argue:

"...35 U.S.C. § 103(c)(1) provides that "[s]ubject matter developed by another person, which qualifies as prior art only under one or more of subsections (e), (f), and (g) of section 102 of this title, shall not preclude patentability under this section where the subject matter and the claimed invention were, at the time the claimed invention was made, owned by the same person or subject to an obligation of assignment to the same person." Applicants confirm that the subject matter of the Schultz et al. '333 patent and the claimed invention were, at the time the invention was made, assigned or under obligation of assignment to the same entity. The invention claimed in the instant application was owned by The Scripps Research Institute ("Scripps") or subject to an obligation of assignment to Scripps at the time the instant

Art Unit: 1656

invention was made, as evidenced by an assignment executed by the inventors (Reel/Frame No. 014977/0270). This assignment was recorded on August 5, 2004...

Applicant's argument has been carefully considered and found to be persuasive. The rejection under 35 U.S.C. 103(a) has been withdrawn. Furthermore an obviousness double patenting rejection cannot be made because the above 103(a) rejection was made based mainly on the disclosure of the specification in the patent.

Claim amendments:

38. (Currently amended) A composition comprising a recombinant mutant GAL4 protein, or portion thereof, in a eukaryotic cell, wherein the mutant GALA protein, or portion thereof, comprises at least one unnatural amino acid selected from the group consisting of a p-acetyl-L-phenylalanine (1), p-benzoyl-L-phenylalanine (2), p-azido-L-phenylalanine (3), O-methyl-L-tyrosine (4), and p-iodo-L-phenylalanine and wherein the GAL4 protein, or portion thereof is at least 90% identical to a GAL4 protein encoded by a polynucleotide amplified from vector pCL1 using a forward PCR primer comprising a nucleotide sequence set forth in SEQ ID NO: 103 and a reverse PCR primer comprising a nucleotide sequence set forth in SEQ ID NO: 104 that comprises a full-length wild-type N-terminal DNA binding domain and a full-length wild-type C-terminal activation domain, and wherein the recombinant mutant GALA protein is capable of activating a GAL4 responsive gene.

Claim 131. Delete "an analogue thereof" from line 11 of the claim.

Claim 132. Delete "an analogue thereof" from line 3 of the claim.

Art Unit: 1656

Conclusion:

Claims 38, 39, 41, 42, 47, 50-57, 131-133, 144-147, 149-151 are allowed with the above amendment.

Reason for allowance

Although Gal 4 proteins modified by phosphorylation or S35 labeling is disclosed in the prior art, a Gal 4 protein composition comprising the unnatural amino acids recited are not disclosed in the prior art.

Furthermore a composition comprising proteins comprising unnatural amino acids which are post-translationally modified and additionally comprise oligosaccharides covalently coupled to an asparagine, threonine or serine residue are not specifically disclosed in the prior art.

Relevant reference: Mylin et al. (1989). Regulated phosphorylation and dephosphorylation of GAL4, a transcriptional activator Lawrence. GENES & DEVELOPMENT 3:1157-1165.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to KAGNEW H. GEBREYESUS whose telephone number is (571)272-2937. The examiner can normally be reached on 8:30am-5:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, ANDREW WANG can be reached on 571-272-0811. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

Art Unit: 1656

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/Kagnew H Gebreyesus/

Examiner, Art Unit 1656

/Andrew Wang/

Supervisory Patent Examiner, Art Unit 1656